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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
10/615,311	07/07/2003	Timo Kleinwacchter	HOE-764	9366

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EXAMINER

FOSTER, MARLEE CHRISTINE

ART UNIT	PAPER NUMBER
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3731

DATE MAILED: 08/10/2006

Please find below and/or attached an Office communication concerning this application or proceeding.

Office Action Summary	Application No.	Applicant(s)	
	10/615,311	KLEINWAECHTER, TIMO	
	Examiner	Art Unit	
	Marlee C. Foster	3731	

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 3 MONTH(S) OR THIRTY (30) DAYS, WHICHEVER IS LONGER, FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133). Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

Status

- 1) ☒ Responsive to communication(s) filed on 07 July 2003.
- 2a) ☐ This action is **FINAL**. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

Disposition of Claims

- 4) ☒ Claim(s) 1-27 is/are pending in the application.
- 4a) Of the above claim(s) _____ is/are withdrawn from consideration.
- 5) ☐ Claim(s) _____ is/are allowed.
- 6) ☒ Claim(s) 1-27 is/are rejected.
- 7) ☐ Claim(s) _____ is/are objected to.
- 8) ☐ Claim(s) _____ are subject to restriction and/or election requirement.

Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☒ The drawing(s) filed on 07 July 2003 is/are: a) ☒ accepted or b) ☐ objected to by the Examiner.
Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
Replacement drawing sheet(s) including the correction is required if the drawing(s) is objected to. See 37 CFR 1.121(d).
- 11) ☐ The oath or declaration is objected to by the Examiner. Note the attached Office Action or form PTO-152.

Priority under 35 U.S.C. § 119

- 12) ☒ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☒ All b) ☐ Some * c) ☐ None of:
1. ☒ Certified copies of the priority documents have been received.
2. ☐ Certified copies of the priority documents have been received in Application No. _____.
3. ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).

* See the attached detailed Office action for a list of the certified copies not received.

Attachment(s)

- | | |
|---|---|
| 1) <input checked="" type="checkbox"/> Notice of References Cited (PTO-892) | 4) <input type="checkbox"/> Interview Summary (PTO-413)
Paper No(s)/Mail Date. _____ |
| 2) <input type="checkbox"/> Notice of Draftsperson's Patent Drawing Review (PTO-948) | 5) <input type="checkbox"/> Notice of Informal Patent Application (PTO-152) |
| 3) <input checked="" type="checkbox"/> Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)
Paper No(s)/Mail Date <u>9 October 2003</u> . | 6) <input type="checkbox"/> Other: _____ |

DETAILED ACTION

Specification

1. The abstract of the disclosure is objected to because it contains numerous spelling errors. The Examiner respectfully requests the word "utilisable" in line 4 reflect the American English spelling, "utilizable". Correction is required. See MPEP § 608.01(b).

2. The disclosure is objected to because of the following informalities:
The Examiner respectfully requests the following words be used with the American English spelling:

The word "utilisable" on page 1, line 28, should be changed to "utilizable".

The word "minimised" on page 2 line 20, and page 5 lines 20 and 33 should be changed to "minimized".

The word "minimising" on page 3, line 29 should be changed to "minimizing".

On page 11, line 33, the word "mean" should be changed to "means".

Appropriate correction is required.

Claim Rejections - 35 USC § 112

3. The following is a quotation of the second paragraph of 35 U.S.C. 112:

The specification shall conclude with one or more claims particularly pointing out and distinctly claiming the subject matter which the applicant regards as his invention.

4. Claim 21 is rejected under 35 U.S.C. 112, second paragraph, as being indefinite for failing to particularly point out and distinctly claim the subject matter which applicant

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regards as the invention. In claim 21, the language recites "the first tooth flanks of the next but one adjacent teeth"... lie in a plane, and thus renders the scope of the claim unclear.

Claim Rejections - 35 USC § 103

5. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

6. The factual inquiries set forth in *Graham v. John Deere Co.*, 383 U.S. 1, 148 USPQ 459 (1966), that are applied for establishing a background for determining obviousness under 35 U.S.C. 103(a) are summarized as follows:

1. Determining the scope and contents of the prior art.
2. Ascertaining the differences between the prior art and the claims at issue.
3. Resolving the level of ordinary skill in the pertinent art.
4. Considering objective evidence present in the application indicating obviousness or nonobviousness.

7. Claims 1-20, 22, and 27 are rejected under 35 U.S.C. 103(a) as being unpatentable over Arnegger (US 4,513,742) in view of Sonefors (US 5,361,665).

8. Arnegger teaches a surgical saw blade with a holder body 44, a row of teeth 42, and a plurality of channels 43. The channels are formed between opposed, non-parallel tooth flanks in a trough shape with respect to an axis of symmetry 9, and act to remove the cut particles, reducing the friction and heat produced by the blade (col. 3, lines 56-

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58). Arnegger also discloses a holder body channel 43 that extends along the row of teeth through a lower and upper face of the holder body. Arnegger further discloses an indent 11 that connects the blade to an oscillating saw (col. 3, lines 48-50).

9. Regarding claim 2, 6 and 12, Arnegger shows in Figure 4 a plurality of channels 22 that connect with a holder body channel 13. Arnegger is silent with regard to the actual dimensions of the holder body channel with respect to thickness, but it is shown in Figure 2 that the thickness of the holder body channel is between 15% and 35% of the holder body.

10. Regarding claim 16, Arnegger discloses that the height of the teeth is equal to the width of the holder body as shown in Figure 3 (col. 2 lines 29-32). Regarding claim 27, Figure 2 shows the thickness of the row of teeth is greater than the thickness outside the row of teeth on the holder body.

11. Arnegger fails to teach a plurality of teeth formed with three flanks in the vicinity of the tip of the tooth.

12. Sonefors discloses, in Figure 2, a first tooth flank 6 that is substantially parallel between an upper and lower face and parallel to each other relative to the first and second surface. The thickness in the area of row of teeth between first tooth flanks of adjacent teeth is more than the spacing between the first and second surface (col. 2, lines 54-58). The second and third tooth flanks (5 and 4 respectively) are arranged at an angle to the lower and upper face of the holder body. The geometry of the teeth allow for a straight cut with a visual guide.

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13. At the time of the invention it would have been obvious to one of ordinary skill in the art to combine the device of Arnegger with the teeth of Sonefors. Using the geometrical design of Sonefors, the teeth would help the saw make a straight cut and function as a vertical guiding surface, reducing the risk for damage to the surrounding tissues.

14. Claims 23-25 and 26 are rejected under 35 U.S.C. 103(a) as being unpatentable over Arnegger (US 4,513,742) in view of Sonefors (US 5,361,665) and in further view of Gerber (US 4,653,373). Arnegger teaches a surgical saw blade with channels 43 and a row of teeth 42. Arnegger fails to teach a saw blade composed of a stiff portion and a resilient portion, with a plurality of recesses within the blade formed along an axis of symmetry. Gerber teaches, in Figure 13, a blade 210 formed with an inner portion 230 and an outer portion 232, each composed of a material with a different hardness. Gerber also discloses, in Figure 9, a plurality of evenly spaced recesses 149. The combination of stiff and resilient materials reduces vibrations while maintaining the longevity of the blade. At the time the invention was made, it would have been obvious to one of ordinary skill in the art to combine the device of Arnegger with the blade of Gerber in order to reduce the vibrations generated from the blade while incorporating a high-wear material on the exterior of the blade.

15. Claim 26 recites a process of arrangement and construction of the recesses in the blade. The determination of patentability in a product-by-process claim is based on the product itself, even though the claim may be limited and defined by the process. That is, the product in such a claim is unpatentable if it is the same as or obvious from

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the product of the prior art, even if the prior product was made by a different process. In *re Thorpe*, 777 F.2d 695, 697, 227 USPQ 964, 966 (Fed. Cir. 1985). A product-by-process limitation adds no patentable distinction to the claim, and is unpatentable if the claimed product is the same as a product of the prior art.

Conclusion

16. The prior art made of record and not relied upon is considered pertinent to applicant's disclosure. Pascaloff (US 5,122,142), Hausmann et al. (US 7,001,403) and Fletcher et al. (US 6,503,253) disclose surgical saw blades of interest. Pascaloff teaches a surgical saw blade with channels extending to the teeth. Hausmann et al. teaches a plurality of channels within the saw blade.

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Marlee C. Foster whose telephone number is (571) 272-5072. The examiner can normally be reached on Monday to Friday 8:00 to 5:00.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Anhtuan Nguyen can be reached on (571) 272-4963. The fax phone number for the organization where this application or proceeding is assigned is 571-273-8300.

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Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see <http://pair-direct.uspto.gov>. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free). If you would like assistance from a USPTO Customer Service Representative or access to the automated information system, call 800-786-9199 (IN USA OR CANADA) or 571-272-1000.

MCA

MCF

2 August 2006


ANH TUAN T. NGUYEN
SUPERVISORY PATENT EXAMINER

8/7/06